

Compliance Testing

CAUTION: Changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user’s authority to operate the equipment.

CE Certifications

This equipment has been tested and found to meet the radiated and conducted emission limits for a **Class B** product of **EN 55022** to the **EMC Directive 89/336/EEC** requirements.

This equipment has been tested and found to meet the immunity levels for **Class 1** tested to **level 2** for **EN 6100-4-2**, tested to **level 3** for **EN 61000-4-3**, tested to **level 2** for **EN 61000-4-4**, and tested to **level 3** for **EN 61000-4-5** to the **EN 50082-1** requirements and meets the **Class A** requirements for **EN 61000-3-2** and **EN 61000-3-3**.

This equipment has completed the Product Safety Review and found to meet the **Low Voltage Directive 72/23/EEC (1993)** requirements.

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Customer Service

This Quick Installation Guide was written to help you get to know your new 10/100-AT quickly and easily. We would welcome any comments or suggestions you may have regarding this Quick Installation Guide. Please send your remarks and recommendations via mail, telephone, facsimile, or Internet E-mail.

Datacom Customer Service personnel are available from 8 AM to 5:30 PM Eastern time, weekdays. Customer Service is available via telephone, facsimile, and Internet E-mail. Outside of support hours, please leave a voice message and our Customer Service Staff will return your call as soon as possible.

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DATACOMsystems® Family of Products



OPTICALswitch™

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
1X8SP-OM (S)	8	100FX, OC3, OC12, Gigabit	Dual SC
1X8SY-OM (S)	8	100FX, OC3, OC12, Gigabit	Dual SC

LANswitch™

ATM In-Line

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
2X8SY-ATM-M (S)	2x8	ATM, OC3-OC12	Dual SC

Ethernet/Token Ring

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
2X16FD-SY	2x16	10/100 BaseT	RJ45
MX8100E/Ts/	2x8	10/100 BaseT or Token	RJ45
MX16100E/Ts/	2x16	10/100 BaseT or Token	RJ45

Fiber Custom

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
4XSPSY-CM	4	Gigabit	Dual SC
4X8SY-SX	4X8	Gigabit	Dual SC
4X8SP4-SX	4X8	Gigabit	Dual SC
4X16SP-SX	4X16	Gigabit	Dual SC

Gigabit In-Line

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
1X8SY-SX (LX)	1x8	Gigabit	Dual SC
2X8SY-SX (LX)	2x8	Gigabit	Dual SC

Gigabit SPAN

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
1X8SP-SX (LX)	1x8	Gigabit	Dual SC
2X4SY-SX (LX)	2x4	Gigabit	Dual SC
2X8SY-SX (LX)	2x8	Gigabit	Dual SC

Gigabit SPAN + In-Line

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
2X8SP4-SX (LX)	2x8	Gigabit	Dual SC

Receive Only

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
2X8RX-SX	2x8	Gigabit	Dual SC

ACCESSORY

Software

MANAgents — Multiple Agent Controlling Console Software

Support

- M3415A — V.35 Connectivity Panel
- RMC-3 — 1U Rack Panel for 3 Small Form DSI Products
- SCS — Switch Control Server

TAP

Ethernet/Token Ring

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
10/100-AT	1	10/100 BaseT	RJ45
1000BT-AT	1	1000 BaseT	RJ45

Fiber

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
F50/50/62-M	1	100FX, OC3, OC12, Gigabit	Dual SC
F50/50/50-M	1	100FX, OC3, OC12, Gigabit	Dual SC
F50/50/9-S	1	OC3, OC12, Gigabit	Dual SC

PERMALink™ Tray

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
8SY-M/62	8	100FX, OC3, OC12, Gigabit	Dual SC
8SY-M/50	8	100FX, OC3, OC12, Gigabit	Dual SC
8SY-S/9	8	OC3, OC12, Gigabit	Dual SC

VERSAtap™

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
4SY-SX+4C	4	Gigabit	Dual SC & LC

WAN

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
DS3AT1 (4) (8)	1 (4) (8)	DS3	BNC
DS3-AT	1	DS3	BNC
DS3/E3-PT	1	DS3/E3	BNC
E3-AT	1	E3	BNC
T1/E1-PT	1	T1/E1	RJ48

VERSALink™

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
1X4SY-SX+2C	1X4	Gigabit	Dual SC & LC
1X8SY-SX+2C	1X8	Gigabit	Dual SC & LC
2X4SY-SX+2C	2X4	Gigabit	Dual SC & LC
2X8SY-SX+2C	2X8	Gigabit	Dual SC & LC

WAN

MODEL	PORTS	TOPOLOGY	CONNECTIVITY
W2358Ds/	2X8	WAN	DB15
WX8T1/E1s/	2X8	T1/E1	RJ48
WX16T1/E1s/	2X16	T1/E1	RJ48
D28100BTs/	1x8 • 1x8	10/100BaseT and WAN	RJ48 • DB15
DS3-8Cs/	2X8	DS3	BNC
2X4SY-DS3/E3	2X4	DS3/E3	BNC

DATACOMsystems®
1000BT-AT-SX Full-Duplex Tap

Quick Installation Guide



February 2004

Part Number: 541-0078-A.00

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Warranty

1 What's in the Package



2 Introduction

The 1000BT-AT-SX is a single-port full-duplex device that provides an easy method to rapidly and effectively deploy your analysis tools to monitor 1000 BaseT traffic between your network devices. Typically the tap is installed on a critical 1000 BaseT link in the network where monitoring and analysis capabilities are important.

1000BT-AT-SX features and benefits:

- 1000 BaseT compatible
- Full duplex monitoring
- Power fault tolerant
- Standard RJ45 and SX connectors

3 1000BT-AT-SX Specifications

Feature	Specification
Channel	One directional 1000 BaseT Ethernet
Cable Type	CAT 5E and Multimode fiber
Port Connectivity	
NETWORK A	RJ45
NETWORK B	RJ45
TAP A	SX
TAP B	SX
Distance Limit	90 meter maximum length between network end-points. Tap typically 1 meter.
Power Requirements	External power supply 5 VDC, 1 A
Operating Temperature	0° to 40° C (32° to 104° F)
Storage Temperature	-30° to 65° C (-22° to 149° F)
Humidity	Less than 95° C non-condensing
Dimensions	1.10" (H) x 5.75" (W) x 5.75" (D) (includes rack mount bracket)
	28 mm (H) x 146 mm (W) x 146 mm (D)
Weight	Unit - 12 ounces; Shipping - 2 pounds

4 Installing a 1000BT-AT-SX in an Equipment Rack

Prior to putting the 1000BT-AT-SX in a standard 19-inch rack you may want to contact your 1000BT-AT-SX representative to discuss an optional rack panel or ...



1000BT-AT-SX device with thumbscrew bracket to mount in RMC-3 panel



Three devices shown mounted in optional rack panel

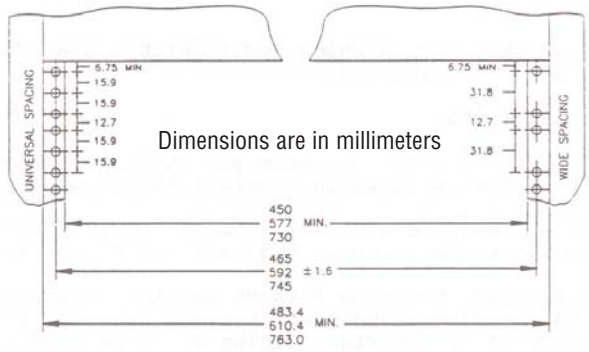
optional single mount rack bracket.



Single device shown with rack mount bracket

In any case, a couple of equipment considerations should be noted:

- Do you have universal or wide spacing flanges?
- The 1000BT-AT-SX occupies 1 unit of space when properly fastened in a universal flange. The 1000BT-AT-SX occupies part of 2 adjoining units of space when improperly fastened in a wide spacing hole of a universal or wide-space flange.



ANSI/EIA-310-D-1992 Mounting Flange Dimensional Requirements

5 Functional Operation

Refer to **FIGURE 1** for a diagram of the functional operation of the 1000BT-AT-SX.

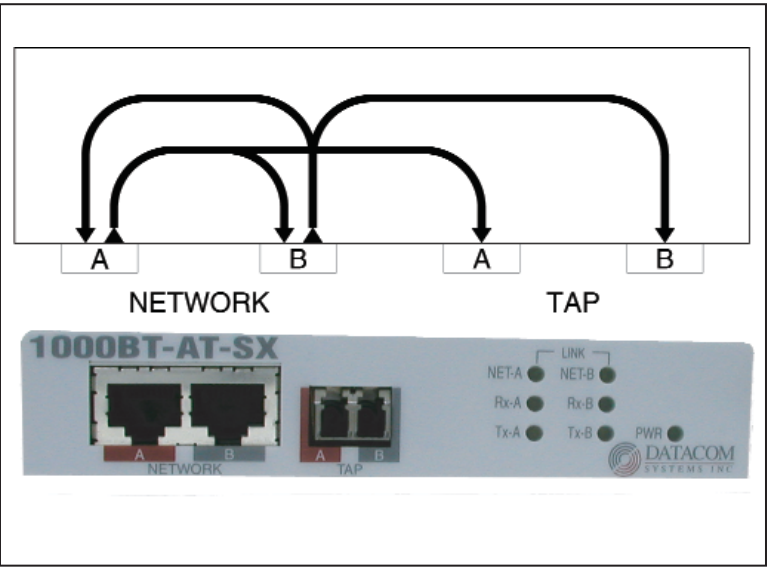


FIGURE 1 — 1000BT-AT-SX Functional Diagram

6 Connecting a 1000BT-AT-SX to the the Network

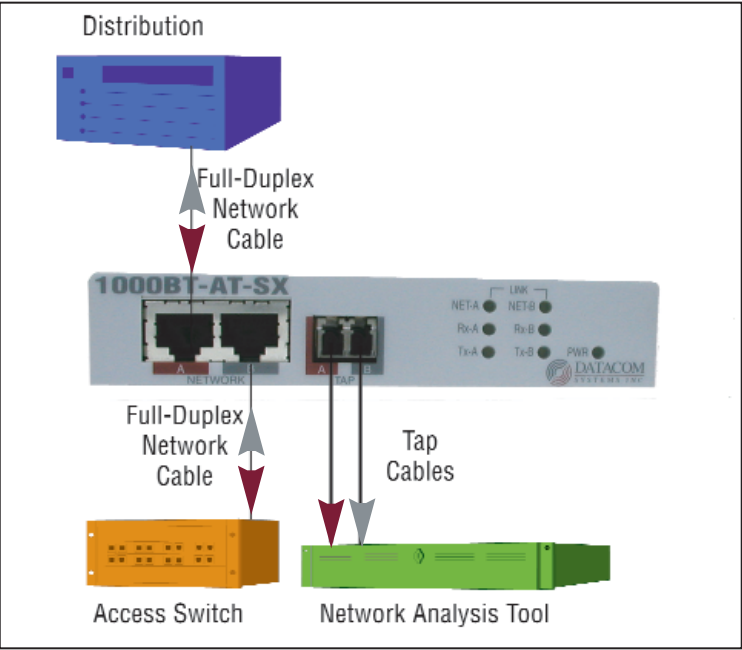


FIGURE 2 — 1000BT-AT-SX Simple Connectivity Diagram

To connect the 1000BT-AT-SX into the network, refer to **FIGURE 2** and follow these steps:

IMPORTANT: *The maximum length of 90 meters must not be exceeded between end-points.*

1. Connect the Power Supply barrel connector into the **POWER** port of the 1000BT-AT-SX and then plug the Power Supply into the external power source wall receptacle. The **POWER** LED to the right of the RJ connectors illuminates indicating power is on.
2. Connect one of the network device cables to the 1000BT-AT-SX RJ45 port **NETWORK A** connector. The **NET-A LINK** LED illuminates indicating link has been established between the **NETWORK A** connector and NETWORK A device.
3. Connect the other network device cable to the 1000BT-AT-SX RJ45 port **NETWORK B** connector. The **NET-B LINK** LED illuminates indicating link has been established between the **NETWORK B** connector and NETWORK B device.

The **Rx-A**, **Tx-A**, **Rx-B**, and **Tx-B** LEDs illuminate as data is passed back and forth between the NETWORK A and NETWORK B device.

4. Connect one tap cable from the 1000BT-AT-SX RJ45 port **TAP A** connector into one port of the Network Analysis Tool interface card. The **TAP-A LINK** LED illuminates indicating link has been established between the **TAP A** connector and Network Analysis Tool interface card.
5. Connect the other tap cable from the 1000BT-AT-SX RJ45 port **TAP B** connector into the other port of the Network Analysis Tool interface card. The **TAP-B LINK** LED illuminates indicating link has been established between the **TAP B** connector and Network Analysis Tool interface card.